

IN THE DRAWINGS

Please amend the drawings as indicated on the enclosed replacement drawing sheets. Each of the replacement drawing sheets are identified as a “Replacement Sheet” in accordance with current drawing amendment rules. The drawings are only amended to add a “PRIOR ART” legend as requested by the Examiner to FIGS. 3A-3E. Applicant respectfully requests that the replacement drawings be entered into the Application. It is believed that the replacement drawings do not introduce any new matter into the Application and fully conform with 37 C.F.R. § 1.84.

REMARKS

In the 14 June 2006 *Office Action*, the Examiner rejects Claims 17-31 and allows Claim 32. Applicant thanks the Examiner with appreciation for the careful consideration and examination given to the Application. Applicant also thanks the Examiner for allowing Claim 32. In response to the *Office Action*, Applicant provides remarks and amendments.

After entry of this Response, Claims 17-32 are pending in the Application. No new matter is believed to be added by this submission. Applicant respectfully asserts that Claims 17-32 are in condition for full allowance and respectfully requests reconsideration of the claims in light of the below remarks. It is believed that the Application is allowable for the below reasons.

I. Drawings and Specification Objections

The Examiner objects to the *Drawings* and *Specification* in the *Office Action*. In response, Applicant amends the *Drawings* (see enclosed Replacement Sheets) and *Specification* as suggested by the Examiner. Applicant kindly thanks the Examiner for the suggested amendments. In light of the *Drawing* and *Specification* amendments, Applicant believes that the objections have been overcome. Accordingly, withdrawal of the objections is respectfully requested.

II. 35 U.S.C. § 101 Rejections

The Examiner rejects Claims 17-31 under 35 U.S.C. § 101 as allegedly being directed to non-statutory subject matter. In response, Applicant amends Claims 17 and 24 to clarify that the currently claimed embodiments of Applicant's invention produce fluid flow characteristics, which are useful, concrete, and tangible results. Applicant respectfully asserts that the clarifying amendments are supported by at least FIG. 2 and Paragraphs 28-32 and 51-53 of Applicant's originally-filed application as published at PGPUB US2006/0015267. Accordingly, Applicant respectfully asserts that Claims 17-31 are in condition for allowance. Withdrawal of the § 101 rejection is respectfully requested.

III. Fees

Applicant timely submits this Response within four months of the 14 June 2006 *Office Action*, with no additional claims, and petitions the Office for a one-month extension pursuant to 37 C.F.R. § 1.136. Thus, other than a one month extension fee, Applicant believes that no additional fees are due. The Commissioner is authorized, however, to charge any fees that may be required, or credit any overpayment, to Deposit Account No. 20-1507.

IV. Conclusion

The foregoing is believed to be a complete response to the *Office Action* mailed 14 June 2006. Applicant respectfully asserts that Claims 17-32 are in condition for full allowance and respectfully requests passing of this case in due course of patent office business. If the Examiner believes there are other issues that can be resolved by a telephone interview, or there are any informalities remaining in the application which may be corrected by an Examiner's amendment, a telephone call to Hunter Yancey at (404) 885-3696 is respectfully requested.

Respectfully submitted,
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